

REMARKS

Overview

This amendment accompanies a request for continued examination.

Claims 1, 2, 4, 5, 8, 10, 13-25, 45, 46 and 48-54 are pending in the present application.

The present response is an earnest effort to place all claims in proper form for immediate allowance. Reconsideration and allowance are respectfully requested.

Claim Rejections Under 35 U.S.C. § 103

Claims 1, 2, 4, 5, 10, 13-17, 19-25, 45, 46, 49-52 and 54 have been rejected under 35 U.S.C. § 103(a) as being unpatentable over Alt et al. (U.S. Patent No. 5,898,384) in view of Gordin et al. (U.S. Patent No. 4,712,167). It is respectfully submitted that the Examiner's reasons for combining the references is in error, and also that the combined references do not teach all of the limitations of the claimed invention. Therefore, this rejection is respectfully traversed.

Independent Claims 1 and 45

Regarding claims 1 and 45, the Examiner suggest that Alt teaches all of the limitations except for 1) a plurality of arrays of lighting fixtures; and 2) each array comprising a set of high intensity light sources and ballast circuits adapted to be switched to connect or disconnect to a relatively high voltage power source. It is the Examiner's position that Gordin teaches these limitations not taught by Alt et al. and therefore all of the limitations of these claims have been met. It is respectfully submitted that this combination is in error and that Alt teaches less than the Examiner purports it to teach. Therefore, it is believed that this rejection is in error and should be withdrawn.

The combination of US 5,898,384 and US 4,712,617 does not teach or anticipate the inventive claims of the present application; rather, the combination teaches away from the present application for the following reasons.

With respect to Gordin, it discloses a system for mobile, variable lighting. This is, essentially, non-analogous art as the present application discloses a permanent lighting system wherein control functions serve to turn lights on and off only and add no functionality for adjustability of the quality of lighting. For example, Gordin discloses a control panel in operative connection with control circuitry which may control individual lights on one fixture in terms of power, alignment relative to a cross-arm, height relative to the ground, and beam shape (see Figure 5 of Gordin) to produce a customized lighting scheme. Regardless of whether the control panel is local (see reference no. 46) to the disclosed vehicle (and therefore, control circuitry), somewhat remote (hardwired by a long cable – see reference no. 48), or remote (see reference no. 50), a person or persons must be physically present at or near the target area to determine if the quality of light produced is acceptable. Since the quality of light produced (i.e., the aesthetic) for a particular application is subjective and nowhere defined or quantified in Gordin, there are no teachings as to how a person at the target area may communicate needs in lighting changes to an operator of the control panel if the control panel is located a significant distance away from the target area (e.g., several states away).

The addition of Alt to Gordin does not solve this problem, and certainly does not suggest a solution commensurate with the inventive concepts of the claimed present invention. Alt discloses a control system for remotely controlling electrical devices, but specifically teaches away from a control system as specifically claimed in the present application. The system disclosed by Alt requires that the command control center accept and decode all answer-back

messages from the electrical devices, determine if the subscriber should be notified, notify the subscriber, and accept any new commands from the subscriber. There are no provisions whereby the subscriber may initiate changes to operating protocol – the subscriber must wait to be contacted by the command control center (see Column 8, lines 5-22). This waiting period may be exacerbated by any number of factors: a member of the command control center determining the subscriber does not need to be contacted, a delay in decoding the answer-back message (due to the large number of answer-back messages sent to the command center at a single time – see Column 7 lines 41-46 and Column 8 lines 7-14), or otherwise. In contrast, the invention disclosed by the cited Gordin reference requires frequent and immediate (or nearly immediate) feedback from a customer to be effective – this is not practical with the control methods disclosed by Alt. Conversely, in the claimed present invention a customer may initiate contact with the control central (see reference no. 10) at any time, by a variety of methods, without being physically present at the target area, and changes to operating protocol effectuated in minutes (see paragraph 0193).

Furthermore, even if the teachings of Alt and Gordin references are combined, it is respectfully submitted that the combination of Alt et al. and Gordin et al. does not teach all of the limitations of independent claims 1 or 45. Claim 1 includes the limitations of "an off-site central controller including a database of events or conditions related to arrays of each wide-area lighting system...the database of events or conditions for each wide-area lighting system being changeable at the off-site central controller." The Examiner points to col. 11, lines 20-50 and col. 13, lines 25-60 as teaching this limitation. However, it is respectfully submitted that the central computer described in Alt et al. does not include this database of events or conditions, but rather contains data to broadcast "timing and event reference signals." See col. 13, line 4.

Instead of the database of events or conditions being located at the central location, Alt et al. teaches the database of events or conditions being located on-site at each sign board. For example, col. 10, lines 5-33 lists a number of events or conditions for on-site control of the sign board. Claim 45 includes a similar limitation of "a database stored in said memory" of the computer in the central control system. Therefore, it is respectfully submitted that this limitation of claims 1 and 45 has not been met.

Dependent Claims 2, 16, 46 and 54

Regarding claims 2, 16, 46, and 54, it is respectfully submitted that this limitation is not taught by Alt et al. for either the reasons discussed above or for the following. These claims include the limitations of "wherein the database comprises a schedule of events." Examiner points to col. 10, lines 5-30 as teaching this limitation. However, this database is not maintained at the off-site central control unit, but is rather controlled by the on-site control unit. Alt et al. in col. 10, lines 5-8 teaches that "control unit 16, and response to receive programming and reference signals, causes each phase of sign board 10 to independently operate in one of five lighting verticals." The language "lighting protocols" indicates that the control unit has preprogrammed on/off cycles and the cycle is initiated by a control signal received from the off-site computer. The off-site computer does not communicate with the control unit at each of the specified events. Further, the language in claim 2 of "schedule of events" is broader than merely controlling the on/off times of the lighting system. As described in Applicant's disclosure, paragraph 94, the scheduling information may include "nonrecurring lighting on or off for each lighting zone (section 3), and recurring lighting on and off functions for each zone, including date (section 4)." Therefore, this schedule of events may include not just independent on/off cycles but modifying the on/off signals over a period of dates. For example, the schedule may

include information such as providing lighting every night from sunset to 7:00 and every Monday with additional lighting from 7:00 to 10:00. Individual users may also indicate specific dates to include lighting for later times. This feature is not taught by Alt et al. and therefore these claims are respectfully submitted to be allowable.

Regarding claim 54, this limitation is respectfully submitted to be allowable over the prior art for the reasons discussed with respect to claims 2, 16, and 46. Additionally, because Alt et al. does not teach maintaining a storage database at the central computer, Alt et al. further does not teach the central computer communicating with the customer to confirm receipt of the schedule. Therefore, this claim is submitted to be allowable.

Claims 4 and 5

Regarding claims 4 and 5, these claims should be allowed as depending from an allowable base claim.

Claims 8, 19 and 48

Regarding claims 8, 19, and 48, these claims are allowable either independently or as depending from an allowable base claim. It is respectfully submitted that the combination of Gordin et al. with Alt et al. is in error for the following reasons. Gordin et al. is concerned with a mobile, variable affect lighting device featuring a lighting array, which the Examiner correctly notes may be used for sports or security lighting. In contrast, Alt et al. teaches programmable remote control systems for electrical apparatus, which may include lighting systems. Alt et al. is further concerned with illuminating a two-face sign board, see Figure 1, rather than directly light to a field or other location. Lighting control of sign boards as illustrated in Alt et al. may be automated as it is desired to illuminate signs for the entire duration between sunset and sunrise. In contrast, sports lighting systems such as those described in Gordin et al. are generally only

used for a specified duration. This duration may change depending on the sports season, type of events, and duration of the events. Therefore, a fixed schedule as described in Alt et al. which does not allow for variable control from the central database would not be desirable to an individual seeking to control the light output from sports or security lighting as described in Gordin et al. For these reasons, it is respectfully submitted that this rejection is in error and should be withdrawn.

Dependent claims 13, 17, 18, 20 and 50

Regarding claims 13, 17, 18, 20, and 50, it is respectfully submitted that these claims are allowable as either depending from an allowable base claim or independently. These claims are generally concerned with the communication between the central control and remote location which, in the present claim, includes cellular communication. While Alt et al. lists cellular communications as one type of commercially available paging or two-way radio transmission, the method of using cellular signals to perform such communication is not fully enabled by this disclosure. While a non-enabling reference may qualify as prior art for the purpose of determining obviousness, it is only prior art for that which it teaches. See MPEP § 2121.01. Because Alt et al. does not teach how to use the cellular communication system to accomplish the result indicated, as evidenced by the detailed disclosure in Applicant's specification, it is respectfully submitted that Alt et al. does not teach this limitation as understood by Applicant's disclosure. Therefore, these claims are submitted to be allowable.

Claim 14

Regarding claim 14, this claim is submitted to be allowable as depending from claim 1 for the reasons described above.

Claim 15

Regarding claim 15, it is respectfully submitted that Alt et al. does not communicate from the central controller to an off-site receiver the instructions of "turn on" or "turn off." As described with respect to claim 1, Alt et al. teaches that each on-site receiver receives a reference signal from the central controller indicating a specific lighting protocol which should be enabled. The lighting protocol, part of the internal database of the control unit at the on-site lighting system, then determines the on or off state of the lighting system. Therefore, the off-site computer of Alt et al. does not send a "turn on" or "turn off" signal. It is respectfully submitted that the limitations of this claim have not been met and this claim should be allowable. Alternatively, this claim should be allowed as depending from an allowable base claim.

Claims 21, 22, 23 and 24

Regarding claims 21, 22, 23, and 24, it is respectfully submitted that the limitations of these claims have not been fully met by the cited references. The Examiner points to col. 10 lines 5-8 and col. 11, lines 10-25 of Alt et al. as teaching these limitations. First, the Examiner has previously described the lighting protocols described in lines 5-33 as the database which controls the lighting system, rather than components to revise the database. Second, while Alt et al. describes these lighting protocols as exemplary and may include more a greater or lesser number of lighting protocols, Alt et al. at no point describes adding or removing lighting protocols from this database. Rather, Alt et al. describes modifying the lighting system to utilize one of different lighting protocols. Therefore, it is respectfully submitted that all of the limitations of these claims have not been met.

Dependent Claim 51

Regarding claim 51, it is respectfully submitted that this claim is allowable either independently or as depending from an allowable base claim. This claim includes the limitations of "said data relates to instructions regarding the operation of an electrical load." Col. 6, lines 30-41 pointed to by the Examiner does not teach this limitation. At no point does Alt et al. disclose modifying the database to indicate a certain electrical load which should be used for the lighting system. Further, Alt et al. does not teach the central controller directly controlling the lighting system either in an on or off state or by electrical load. Therefore, it is respectfully submitted that this claim is allowable over the cited art.

Dependent Claim 52

Regarding claim 52, this claim is submitted to be allowable for the reasons described above, particularly with respect to claims 13, 17, 18, 20, and 50. Alternatively, this amendment is submitted to be allowable as depending from an allowable base claim.

Dependent Claim 53

Regarding claim 53, this claim should be allowed either independently or depending from an allowable base claim. Claim 53 includes the limitation of "the customer device communicates schedules related to operation of the lighting devices." It is respectfully submitted that Alt et al. does not teach a means or a method for a consumer to communicate directly with the scheduling or programming apparatus, but rather any communications to the lighting system must first pass through the central computer. Because the on-site system controls the schedule when the lights are turned on or off and the duration of lighting, it is respectfully submitted that a consumer practicing the invention taught by Alt et al. could not directly communicate with the scheduling device.

Remaining Claims

The remaining claims are dependent from either claim 1 or claim 45 and are submitted to be allowable for the reasons expressed in support of those claims.

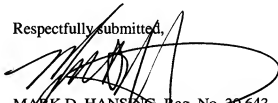
For the reasons described above, it is respectfully submitted that all claims are in condition for immediate allowance.

Conclusion

This amendment accompanies the filing of a Request for Continued Examination (RCE). Please charge Deposit Account No. 26-0084 the amount of \$810.00 (large) for the RCE per the attached transmittal. No other fees or extensions of time are believed to be due in connection with this amendment; however, consider this a request for any extension inadvertently omitted, and charge any additional fees to Deposit Account No. 26-0084.

Reconsideration and allowance is respectfully requested.

Respectfully submitted,



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